## EAST Search History

Ref #	Hits	Search Query	DBs	Default Operator	Plurals	Time Stamp
L1	20	(injection valve sleeve tapered). clm.	US-PGPUB	AND	OFF	2008/10/24 14:48
L2	8	(injection gas valve sleeve tapered).clm.	US-PGPUB	AND	OFF	2008/10/24 14:48
L3	2	(injection gas valve sleeve restrictor).clm.	US-PGPUB	AND	OFF	2008/10/24 14:48
L4	84	(valve sleeve tapered seal).clm.	US-PGPUB	AND	OFF	2008/10/24 14:49
L5	33	(valve sleeve tapered seal ring). clm.	US-PGPUB	AND	OFF	2008/10/24 14:49
L6	2	(lift valve sleeve tapered seal ring).clm.	US-PGPUB	AND	OFF	2008/10/24 14:49
S1	517	166/372.ccls.	US- PGPUB; USPAT; USOCR	AND	OFF	2008/04/07 14:18
S2	16	S1 flapper (spring OR bias OR biased OR biasing) (sleeve OR piston OR (flow ADJ tube))	US- PGPUB; USPAT; USOCR	AND	OFF	2008/04/07 14:19
S3	21	S1 flapper (spring OR bias OR biased OR biasing)	US- PGPUB; USPAT; USOCR	AND	OFF	2008/04/07 14:30
S4	1715	166/372,332.8,319,321.ccls.	US- PGPUB; USPAT; USOCR	AND	OFF	2008/04/07 14:51
<b>S</b> 5	260	S4 (choke OR (flow ADJ restrictor))	US- PGPUB; USPAT; USOCR	AND	OFF	2008/04/07 14:52
S6	54	S5 flapper	US- PGPUB; USPAT; USOCR	AND	OFF	2008/04/07 14:52
S7	399	S4 (gas SAME lift)	US- PGPUB; USPAT; USOCR	AND	OFF	2008/04/07 15:07
S8	37	S7 flapper spring	US- PGPUB; USPAT; USOCR	AND	OFF	2008/04/07 15:07

S9	4	("4248308"   "5004007"   "5257663"   "5535828").PN.	US- PGPUB; USPAT; USOCR	AND	OFF	2008/04/07 15:22
S10	54	lembcke.in.	US- PGPUB; USPAT; USOCR	AND	OFF	2008/04/07 15:33
S11	1715	166/372,332.8,319,321.ccls.	US- PGPUB; USPAT; USOCR	AND	OFF	2008/04/08 10:55
S12	1	S11 valve (sleeve NEAR taper)	US- PGPUB; USPAT; USOCR	AND	OFF	2008/04/08 10:55
S13	10	"166".clas. valve (sleeve NEAR taper)	US- PGPUB; USPAT; USOCR	AND	OFF	2008/04/08 10:56
S14	3	"166".clas. (flapper NEAR (taper OR angle OR angled OR beveled))	US- PGPUB; USPAT; USOCR	AND	OFF	2008/04/08 11:19
S15	36	"166".clas. (flapper NEAR (sleeve))	US- PGPUB; USPAT; USOCR	AND	OFF	2008/04/08 11:23
S16	89	"166".clas. (flapper NEAR (sleeve OR piston OR (flow ADJ tube)))	US- PGPUB; USPAT; USOCR	AND	OFF	2008/04/08 11:23
S17	535	166/372.ccls.	US- PGPUB; USPAT; USOCR	AND	OFF	2008/10/23 09:35
S18	11	S17 (sleeve SAME (taper OR tapered))	US- PGPUB; USPAT; USOCR	AND	OFF	2008/10/23 09:35
S19	2	(injection valve sleeve taper).clm.	US-PGPUB	AND	OFF	2008/10/24 14:47

## 10/24/2008 2:49:30 PM

C:\ Documents and Settings\ bharcourt\ My Documents\ EAST\ Workspaces\ 10593734 method of injecting lift gas into a production tubing.wsp